#30

PAGE: 1

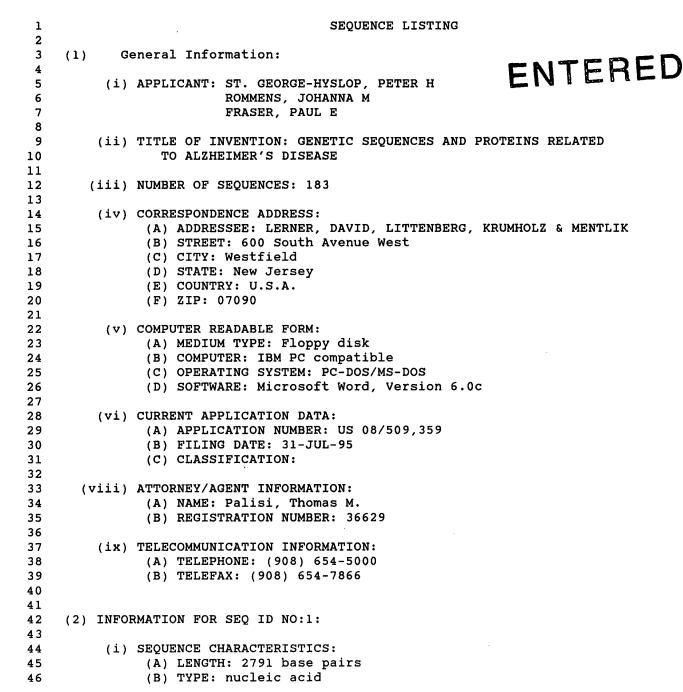
### RAW SEQUENCE LISTING PATENT APPLICATION US/08/509,359B

DATE: 11/23/98 TIME: 13:48:38

INPUT SET: S29990.raw

Y ttod ?

This Raw Listing contains the General Information Section and up to the first 5 pages.



### RAW SEQUENCE LISTING PATENT APPLICATION US/08/509,359B

DATE: 11/23/98 TIME: 13:48:40

INPUT SET: S29990.raw

47	(C)	STRANDEDNESS: single
48	(D)	TOPOLOGY: linear
49		

(ii) MOLECULE TYPE: cDNA

53	(xi) S	EQUENCE	DESCRIPT	rion: s	EQ ID	NO:1:	
54							
55	TGGGACAGGC	AGCTCCG	GGG TCC	CGGTTT	CACA	CCGGAA	

TGGGACAGGC	AGCTCCGGGG	TCCGCGGTTT	CACATCGGAA	ACAAAACAGC	GGCTGGTCTG	60
GAAGGAACCT	GAGCTACGAG	CCGCGGCGGC	AGCGGGGCGG	CGGGGNAAGC	GTATACCTAA	120
TCTGGGAGCC	TGCAAGTGAC	AACAGCCTTT	GCGGTCCTTA	GACAGCTTGG	CCTGGAGGAG	180
AACACATGAA	AGAAAGAACC	TCAAGAGGCT	TTGTTTTCTG	TGAAACAGTA	TTTCTATACA	240
GTTGCTCCAA	TGACAGAGTT	ACCTGCACCG	TTGTCCTACT	TCCAGAATGC	ACAGATGTCT	300
GAGGACAACC	ACCTGAGCAA	TACTGTACGT	AGCCAGAATG	ACAATAGAGA	ACGGCAGGAG	360
CACAACGACA	GACGGAGCCT	TGGCCACCCT	GAGCCATTAT	CTAATGGACG	ACCCCAGGGT	420
AACTCCCGGC	AGGTGGTGGA	GCAAGATGAG	GAAGAAGATG	AGGAGCTGAC	ATTGAAATAT	480
GGCGCCAAGC	ATGTGATCAT	GCTCTTTGTC	CCTGTGACTC	TCTGCATGGT	GGTGGTCGTG	540
GCTACCATTA	AGTCAGTCAG	CTTTTATACC	CGGAAGGATG	GGCAGCTAAT	CTATACCCCA	600
TTCACAGAAG	ATACCGAGAC	TGTGGGCCAG	AGAGCCCTGC	ACTCAATTCT	GAATGCTGCC	660
ATCATGATCA	GTGTCATTGT	TGTCATGACT	ATCCTCCTGG	TGGTTCTGTA	TAAATACAGG	720
TGCTATAAGG	TCATCCATGC	CTGGCTTATT	ATATCATCTC	TATTGTTGCT	GTTCTTTTTT	780
TCATTCATTT	ACTTGGGGGA	AGTGTTTAAA	ACCTATAACG	TTGCTGTGGA	CTACATTACT	840
GTTGCACTCC	TGATCTGGAA	TTTGGGTGTG	GTGGGAATGA	TTTCCATTCA	CTGGAAAGGT	900
CCACTTCGAC	TCCAGCAGGC	ATATCTCATT	ATGATTAGTG	CCCTCATGGC	CCTGGTGTTT	960
ATCAAGTACC	TCCCTGAATG	GACTGCGTGG	CTCATCTTGG	CTGTGATTTC	AGTATATGAT	1020
TTAGTGGCTG	TTTTGTGTCC	GAAAGGTCCA	CTTCGTATGC	TGGTTGAAAC	AGCTCAGGAG	1080
AGAAATGAAA	CGCTTTTTCC	AGCTCTCATT	TACTCCTCAA	CAATGGTGTG	GTTGGTGAAT	1140
ATGGCAGAAG	GAGACCCGGA	AGCTCAAAGG	AGAGTATCCA	AAAATTCCAA	GTATAATGCA	1200
GAAAGCACAG	AAAGGGAGTC	ACAAGACACT	GTTGCAGAGA	ATGATGATGG	CGGGTTCAGT	1260
GAGGAATGGG	AAGCCCAGAG	GGACAGTCAT	CTAGGGCCTC	ATCGCTCTAC	ACCTGAGTCA	1320
CGAGCTGCTG	TCCAGGAACT	TTCCAGCAGT	ATCCTCGCTG	GTGAAGACCC	AGAGGAAAGG	1380

# RAW SEQUENCE LISTING PATENT APPLICATION US/08/509,359B

DATE: 11/23/98 TIME: 13:48:41

#### INPUT SET: S29990.raw

					4	INFUL SEL: 32995	v.ruw
100 101	GGAGTAAAAC	TTGGATTGGG	AGATTTCATT	TTCTACAGTG	TTCTGGTTGG	TAAAGCCTCA	1440
102 103	GCAACAGCCA	GTGGAGACTG	GAACACAACC	ATAGCCTGTT	TCGTAGCCAT	ATTAATTGGT	1500
104							
105 106	TTGTGCCTTA	CATTATTACT	CCTTGCCATT	TTCAAGAAAG	CATTGCCAGC	TCTTCCAATC	1560
107 108	TCCATCACCT	TTGGGCTTGT	TTTCTACTTT	GCCACAGATT	ATCTTGTACA	GCCTTTTATG	1620
109	GACCAATTAG	CATTCCATCA	ATTTTATATC	TAGCATATTT	GCGGTTAGAA	TCCCATGGAT	1680
110 111	GTTTCTTCTT	TGACTATAAC	CAAATCTGGG	GAGGACAAAG	GTGATTTTCC	TGTGTCCACA	1740
112	mama a a a a a	ma a a a a mmaa	OCCOMOCA OM	mmmaa a camm	COMMOON NOT	CITITICO TO A CO	1000
113 114	TCTAACAAAG	TCAAGATTCC	CGGCTGGACT	TTTGCAGCTT	CCTTCCAAGT	CTTCCTGACC	1800
115 116	ACCTTGCACT	ATTGGACTTT	GGAAGGAGGT	GCCTATAGAA	AACGATTTTG	AACATACTTC	1860
117	ATCGCAGTGG	ACTGTGTCCT	CGGTGCAGAA	ACTACCAGAT	TTGAGGGACG	AGGTCAAGGA	1920
118 119	GATATGATAG	GCCCGGAAGT	TGCTGTGCCC	CATCAGCAGC	TTGACGCGTG	GTCACAGGAC	1980
120 121	<b>ር</b> አጥጥጥር አርጥር	ACACTGCGAA	CTCTCAGGAC	<b>ጥ</b> ል ሮሮሮርጥጥል ሮ	СУУСУССТТУ	CCTCAACTCC	2040
122							
123 124	TTTAAACCAA	ACGGAACTCT	TCATCTTAAA	CTACACGTTG	AAAATCAACC	CAATAATTCT	2100
125 126	GTATTAACTG	AATTCTGAAC	TTTTCAGGAG	GTACTGTGAG	GAAGAGCAGG	CACCAGCAGC	2160
127	AGAATGGGGA	ATGGAGAGGT	GGGCAGGGGT	TCCAGCTTCC	CTTTGATTTT	TTGCTGCAGA	2220
128 129	CTCATCCTTT	TTAAATGAGA	CTTGTTTTCC	CCTCTCTTTG	AGTCAAGTCA	AATATGTAGA	2280
130	тааатттааа		amar raaram	a) a) ama) mm	)	A TOTAL COLOR OF THE STATE OF T	0240
131 132	TGCCTTTGGC	AATTCTTCTT	CTCAAGCACT	GACACTCATT	ACCGTCTGTG	ATTGCCATTT	2340
133 134	CTTCCCAAGG	CCAGTCTGAA	CCTGAGGTTG	CTTTATCCTA	AAAGTTTTAA	CCTCAGGTTC	2400
135	CAAATTCAGT	AAATTTTGGA	AACAGTACAG	CTATTTCTCA	TCAATTCTCT	ATCATGTTGA	2460
136 137	AGTCAAATTT	GGATTTTCCA	CCAAATTCTG	AATTTGTAGA	CATACTTGTA	CGCTCACTTG	2520
138 139	CCCCAGATGC	СТССТСТСТСТС	CTCATTCTTC	тстсссасас	<b>አ</b> አርሮልር <b>ጥ</b> ሮጥጥ	TTTCTACAGC	2580
140							
141 142	CAGTAAGGCA	GCTCTGTCGT	GGTAGCAGAT	GGTCCCACTT	ATTCTAGGGT	CTTACTCTTT	2640
143 144	GTATGATGAA	AAGAATGTGT	TATGAATCGG	TGCTGTCAGC	CCTGCTGTCA	GACCTTCTTC	2700
145	CACAGCAAAT	GAGATGTATG	CCCAAAGCGG	TAGAATTAAA	GAAGAGTAAA	ATGGCTGTTG	2760
146 147	AAGCAAAAA	AAAAAAAA	AAAAAAAA	A			2791
148		· <del></del>					
1 4 0							

149 150

(2) INFORMATION FOR SEQ ID NO:2:

151 152

(i) SEQUENCE CHARACTERISTICS:

# RAW SEQUENCE LISTING PATENT APPLICATION US/08/509,359B

DATE: 11/23/98 TIME: 13:48:44

INPUT SET: S29990.raw

													INI	PUT S	ET: S	29990.
153		( A	) LEI	NGTH	: 46	7 am:	ino a	acida	s							
154		(B	) TYI	PE: a	amino	o ac	id									
155		(C	) STI	RANDI	EDNE:	SS: S	sing	Le								
156		( D	) TO	POLO	3Y: .	linea	ar									
157																
158																
159	(ii)	MOL	ECULI	E TY	PE: ]	prote	ein									
160																
161	(xi)	SEQ	UENCI	E DE:	SCRII	PTIO	N: SI	EQ II	ON C	:2:						
162																
163	Met	Thr	Glu	Leu	Pro	Ala	Pro	Leu	Ser	Tyr	Phe	Gln	Asn	Ala	Gln	Met
164	1				5					10					15	
165																
166	Ser	Glu	Asp	Asn	His	Leu	Ser	Asn	Thr	Val	Arg	Ser	Gln	Asn	Asp	Asn
167				20					25					30		
168																
169	Arg	Glu	Arg	Gln	Glu	His	Asn	Asp	Arg	Arg	Ser	Leu	Gly	His	Pro	Glu
170			35					40					45			
171																
172	Pro	Leu	Ser	Asn	Gly	Arg	Pro	Gln	Gly	Asn	Ser	Arg	Gln	Val	Val	Glu
173		50					55					60				
174																
175	Gln	Asp	Glu	Glu	Glu	Asp	Glu	Glu	Leu	Thr	Leu	Lys	Tyr	Gly	Ala	Lys
176	65					70					75					80
177																
178	His	Val	Ile	Met	Leu	Phe	Val	Pro	Val	Thr	Leu	Cys	Met	Val	Val	Val
179					85					90					95	
180																
181	Val	Ala	Thr	Ile	Lys	Ser	Val	Ser	Phe	Tyr	Thr	Arg	Lys	Asp	Gly	Gln
182				100					105					110		
183																
184	Leu	Ile	Tyr	Thr	Pro	Phe	Thr	Glu	Asp	Thr	Glu	Thr	Val	Gly	Gln	Arg
185			115					120					125			
186								_	_	_		_		_	_	_
187	Ala	Leu	His	Ser	Ile	Leu	Asn	Ala	Ala	Ile	Met		Ser	Val	Ile	Val
188		130					135					140				
189																
190		Met	Thr	Ile	Leu		Val	Val	Leu	Tyr	Lys	Tyr	Arg	Cys	Tyr	
191	145					150					155					160
192																
193	Val	Ile	His	Ala	Trp	Leu	Ile	Ile	Ser		Leu	Leu	Leu	Leu	Phe	Phe
194					165					170					175	
195																
196	Phe	Ser	Phe	Ile	Tyr	Leu	Gly	Glu	Val	Phe	Lys	Thr	Tyr	Asn	Val	Ala
197				180					185					190		
198																
199	Val	Asp	_	Ile	Thr	Val	Ala		Leu	Ile	Trp	Asn		Gly	Val	Val
200			195					200					205			
201																
202	Gly	Met	Ile	Ser	Ile	His		Lys	Gly	Pro	Leu		Leu	Gln	Gln	Ala
203		210					215					220				
204																
205	Тyr	Leu	Ile	Met	Ile	Ser	Ala	Leu	Met	Ala	Leu	Val	Phe	Ile	Lys	Tyr

## RAW SEQUENCE LISTING PATENT APPLICATION US/08/509,359B

DATE: 11/23/98 TIME: 13:48:46

INPUT SET: S29990.raw

														INE	PUT S	ET: S	29990.n
206		225					230					235					240
207																_	
208		Leu	Pro	Glu	Trp		Ala	Trp	Leu	Ile		Ala	Val	Ile	Ser	Val	Tyr
209						245					250					255	
210							_		_			_	_	_		_	
211		Asp	Leu	Val		Val	Leu	Cys	Pro	-	Gly	Pro	Leu	Arg		Leu	Val
212					260					265					270		
213							_	_					_		_		_
214		Glu	Thr		Gln	Glu	Arg	Asn		Thr	Leu	Phe	Pro		Leu	Ile	Tyr
215				275					280					285			
216			_				_	_		_					_	_	<b>~</b> 7.
217		Ser		Thr	Met	vaı	Trp		vaı	Asn	мет	Ата		GTĀ	Asp	Pro	GIU
218			290					295					300				
219			<b>a</b> 1	•		**- 7	<b>~</b>	T	<b>.</b>	<b>~</b>	T	M		81-	a1	<b>0</b>	mb
220			GIN	Arg	Arg	vaı		гÀг	ASN	Ser	гÀг	_	ASN	ATA	GIU	Ser	
221		305					310					315					320
222		<b>a</b> 1	N	a1	00-	<u>ما ب</u>	3 ~~	mb =	v. 1	A 7 a	a1.,	N care	7 ~~	<b>X</b> ~ ~	<b>al.</b> ,	<u>ما</u>	Dho
223		GIU	Arg	GTU	ser		ASP	Thr	val	АТА	330	ASII	ASP	ASP	GIÀ	Gly 335	Pne
224						325					330					333	
225		G	<b>a</b> 1	a1	m	a1	210	a1 5	X == ~	1 ~~	C0.7	uia	T 011	a1.,	Dro	uic	A ~~
226 227		Ser	GIU	GIU	340	GIU	АТО	GIII	ALG	345	Ser	ura	ьеи	СТУ	350	His	Arg
228					340					343					330		
229		Sor	Thr	Dro	Glu.	Sar	λra	בוג	λla	Val	aln	Glu	T.em	Ser	Ser	Ser	Tle
230		Ser	1111	355	GIG	Der	Arg	AIG	360	Val	GIII	GIG	пса	365	DCI	DCI	110
231				333					300					303	•		
232		T.e.11	Δla	G] v	Glu	Asn	Pro	Glu	Glu	Ara	Glv	Val	Lvs	Leu	Glv	Leu	Glv
233		пса	370	O.L.y	014	лор	110	375	014	9	019	• • • •	380		017	204	<b>01</b>
234			5,0					0,0									
235		Asp	Phe	Ile	Phe	Tvr	Ser	Val	Leu	Val	Glv	Lvs	Ala	Ser	Ala	Thr	Ala
236		385				-1-	390				1	395	•				400
237																	
238		Ser	Gly	Asp	Trp	Asn	Thr	Thr	Ile	Ala	Cys	Phe	Val	Ala	Île	Leu	Ile
239			•	•	•	405					410					415	
240																	
241		Gly	Leu	Cys	Leu	Thr	Leu	Leu	Leu	Leu	Ala	Ile	Phe	Lys	Lys	Ala	Leu
242		-		-	420					425					430		
243																	
244		Pro	Ala	Leu	Pro	Ile	Ser	Ile	Thr	Phe	Gly	Leu	Val	Phe	Tyr	Phe	Ala
245				435					440					445			
246																	
247		Thr	Asp	Tyr	Leu	Val	Gln		Phe	Met	Asp	Gln	Leu	Ala	Phe	His	Gln
248			450					455					460				
249																	
250			Tyr	Ile													
251		465															
252																	
253																	
254																	
255																	
256	(2)	INFO	RMAT:	ION I	FOR S	SEQ :	ID NO	0:3:									
257									_								
258		(1)	SEQU	JENCI	E CHA	ARAC'	reri:	STICS	<b>:</b>								

# **SEQUENCE VERIFICATION REPORT** PATENT APPLICATION *US/08/509,359B*

DATE: 11/23/98 TIME: 13:48:47

INPUT SET: S29990.raw

Line

Error

Original Text